REMARKS

In response to the Office Action dated September 14, 2006, reconsideration and allowance of the present application are respectively requested. Claims 1-6 remain pending in the application. New claims 7 and 8 have been added. Support for the new claims can be found at, for example, paragraphs [0018] - [0026].

On page 2 of the Office Action, Applicant notes with appreciation the Examiner's withdraw of the previous rejections. However, the Examiner has now applied new rejections to the claims.

More particularly, in numbered paragraph 2 on page 2, claims 4-6 are rejected under 35 U.S.C. §102(e) as being anticipated by commonly assigned U.S. Patent No. 7,003,674 (Hamlin). In numbered paragraph 3 on page 4 of the Office Action, claims 4-6 are also rejected under 35 U.S.C. §102(b) as being anticipated by U.S. Patent No. 5,235,641 (Nozawa et al).

In numbered paragraph 4 on page 5 of the Office Action, claim 1 is rejected under 35 U.S.C. §103(a) as being unpatentable over U.S. Patent No. 6,966,002 (Torrubia-Saez) in view of the Nozawa patent. On pages 6-7 of the Office Action, claims 2-3 are rejected as being unpatentable over the Torrubia-Saez patent in view of the Nozawa patent in further view of U.S. Patent No. 6,681,304 (Vogt).

All of the foregoing rejections are respectfully traversed, as none of the documents relied upon by the Examiner, considered individually or in the various combinations cited, teach or suggest Applicant's invention as set forth in independent claims 1 and 4. For example, none of the documents cited by the Examiner are directed to a disk drive with a disk controller that can perform an

executable function characterized by contents of Applicant's claimed mailbox file. Such a mailbox file can, for example, direct the disk controller to executable code. In contrast, the documents cited by the Examiner use a host command, rather than a mailbox file, to direct a storage device to execute functions such as request authentication and decryption.

Because the Examiner first addressed independent claim 4 first in the Office Action, a discussion of claim 4 will be provided, followed by a discussion of independent claim 1.

Independent claim 4 is directed to a method for accessing a mailbox file associated with a first range of disk drive host interface addressable locations. The claim 4 method includes, recognizing a command from a host operating system in reference to the mailbox file associated with the first range of disk drive host interface addressable locations; and responding to the command by performing within the disk controller an executable function characterized by the contents of the mailbox file.

The Hamlin and Nozawa patents relied upon in the rejection of claim 4, fail to anticipate all features recited in claim 4, such that withdrawal of these rejections is respectfully requested. For example, the commonly assigned Hamlin patent is directed to a disk drive having a disk with a public area for storing plain text data and a pristine area for storing encrypted data. A control system is provided for controlling access to the pristine area of a disk, with access only being granted upon authentication of a request. A secret drive key is provided in the disk drive, and decryption circuitry uses this secret drive key for decrypting encrypted data stored in the pristine area of the disk.

In rejecting claim 4, the Examiner refers to column 5, line 58 through column 7, line 27 of the Hamlin patent. This cited portion of the Hamlin patent is directed to various functions, such as a user/device authentication whereby authentication circuitry 14 uses an entity ID of a request to read an associated password from a pristine area 8, and the request is authenticated if the stored password matches the entity password received in the request. (See column 5, lines 65 to column 6, line 3). The cited portion of the Hamlin patent does not teach recognizing a command from a host operating system in reference to a mailbox file, and then responding to the command by performing within the disk controller an executable function that is **characterized by the contents of the mailbox file**. The disk controller does not perform an executable function that is characterized by the contents of the pristine area; rather, the disk controller compares information included in the request with information stored in the pristine area.

The Hamlin patent also describes that a stored password can be encrypted. Code which is stored in the pristine area 8, as described at column 6, lines 4-12 of the Hamlin patent, can be decrypted at the time it is read using a previously stored secret drive key 16. However, the decryption function is not characterized by contents of any information stored in the pristine area; rather, the decryption is executed regardless of which data is read. As such, the Hamlin patent fails to teach or suggest Applicant's claim 4 method.

The Nozawa patent is directed to an information processing system having an external storage device. The Examiner relies on column 6, line 5 through column 7, line 27 to reject claim 4. This portion of the Nozawa patent is directed to use of an upper rank apparatus 1 serving as a host controller which provides an instruction to

a magnetic tape control device 2. In response to this instruction, a microprocessor 9 of the magnetic tape control device 2 reads from the magnetic tape medium an encrypted data key as described at column 6, lines 36-46. A data key cryptographic device 11 decrypts the key to provide a raw data key, which is set in a data key storage mechanism 8. Subsequently, the decrypted data can be decompressed, if necessary, and sent to the upper rank apparatus 1 through a channel interface control section 3.

Thus, like the Hamlin patent, the Nozawa patent does not teach Applicant's claim 4 combination which includes, among other features, a step of responding to a command by performing, within a disk controller, an executable function **characterized by contents of a mailbox file**. Both of these patents are directed to reading data from a disk location using a function (e.g., decryption) that is characterized by the host controller request, and not by contents of any mailbox file stored on a disk drive. As such, claim 4 is allowable over the documents relied upon by the Examiner.

With regard to claim 1, the Torrubia-Saez patent, considered alone or in combination with the Nozawa patent, fails to teach or suggest Applicant's claim 1 combination. There would have been no motivation or suggestion to have combined the Torrubia-Saez patent with the Nozawa patent in the manner suggested by the Examiner, and even if some combination of features would have been suggested, the presently claimed invention would not have resulted..

The Torrubia-Saez patent is directed to secure distribution of software, and in this regard, is considered no more relevant to the presently claimed invention than the documents already discussed. The Torrubia-Saez patent describes storage of

files on a disk drive, using commands which are executed by a host CPU, not the disk drive. An access key may be generated in Torrubia-Saez, but this access key does not provide access to a mailbox file, wherein the disk drive can perform an executable function characterized by the contents of that file. Thus, there would have been no suggestion in Torrubia-Saez to enable the disk drive to perform an executable function characterized by the contents of a mailbox file (all executable functions are conventionally performed by the host in Torrubia-Saez).

Moreover, there would have been no suggestion to have modified the system of Torrubia-Saez, based upon teachings of Nozawa, to obtain a disk drive access key from an access key server, to create Applicant's claimed mailbox file, or to perform the notifying step of claim 1. Neither of these documents teaches or suggests use of an access key generated as a function of an identifying characteristic of a disk drive, creating a mailbox file using such an access key, and notifying the disk drive of a location of the mailbox file, wherein the disk drive can perform an executable function characterized by contents of the mailbox file. At best, any combination of these two patents would have resulted in storing host-executable files of Torrubia-Saez on a disk drive, and there would have been no motivation or suggestion to make the host-executable files of Torrubia-Saez disk drive-executable. For at least these reasons, the rejection of claim 1 over these patents should be withdrawn.

The Vogt patent, cited on page 6 of the Office Action with regard to claims 2 and 3, fails to overcome the deficiencies of Torrubia-Saez and Nozawa patents. As such, independent claim 1 like independent claim 4 is allowable. The remaining

claims 2-4 and 5-6 are allowable for at least the reasons discussed with respect to independent claims.

In light of the foregoing, the present application is in condition for allowance and a Notice of Allowance is respectfully solicited. Should the Examiner have any questions regarding any of the above, it is respectfully requested that the undersigned be contacted at the number shown below.

Respectfully submitted,

BUCHANAN INGERSOLL PC

Date: Dec. 14, 2006 By: _____

Patrick C. Keane
Registration No. 32858

P.O. Box 1404
Alexandria, VA 22313-1404
703.836.6620